1 ORDINANCE NO.

- 2 AN ORDINANCE AMENDING CHAPTER 6-4 TO THE CITY CODE
- 3 RELATING TO WATER CONSERVATION, REGULATION OF
- 4 COOLING TOWERS, PUBLIC HEALTH MEASURES, AND THE ADDING
- 5 OF NEW OFFENSES THAT MAY BE SUBJECT TO ASSESSMENT OF
- 6 ADMINISTRATIVE PENALTIES; OR CIVIL AND CRIMINAL
- 7 PENALTIES; AND AMENDING SECTION 15-9-241 RELATING TO
- 8 EVAPORATIVE LOSS CREDIT ON WASTEWATER CHARGES FOR
- 9 **COOLING TOWERS.**
- 10 BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF AUSTIN:
- 11 PART 1. FINDINGS.
- 12 The City Council finds that:

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- 1. Given the potential for severe and frequent drought conditions in Central Texas, it is essential that new water use policies to conserve water continue to be developed.
- 2. Water conservation efforts, including policies for responsible water conservation and regulations for cooling towers, help maximize limited resources as population grows while ensuring supply for critical public health and safety needs including adequate supplies necessary for emergency fire fighting, fire suppression, and natural disaster or other emergency management or disaster response.
 - 3. As water is essential to public health and sanitation and the City's water supply is the sole or primary water supply for over a million people, water conservation and drought condition measures that help assure the maintenance of a sufficient City water supply for the City's customers are necessary to protect public health and for the purposes of sanitation.
- 29 **PART 2.** City Code Section 6-4-2 (*Definitions*) is repealed and replaced with a
- 30 new Section 6-4-2 to read as follows:
- 31 **§ 6-4-2 DEFINITIONS.**
- 32 Unless a different definition is expressly provided, in this chapter:

33 34	(1)	ACTION OF THE UTILITY means an action taken by Austin Water pursuant to this chapter.
35 36	(2)	AQUATIC LIFE means a vertebrate organism dependent upon an aquatic environment to sustain its life.
37 38 39 40	(3)	AUTOMATIC IRRIGATION SYSTEM means any irrigation system connected to and being operated by a programmable controller, including a permanently or temporarily installed irrigation system.
41 42	(4)	AUSTIN WATER, AW, AWU, and the Utility mean the Austin Water Utility.
43 44	(5)	AUXILIARY WATER means a water supply from a source other than Austin Water's potable water supply.
45 46 47 48 49 50 51	(6)	AUSTIN WATER AUTHORIZED IRRIGATION INSPECTOR means an Irrigation Inspector licensed by the Texas Commission on Environmental Quality who has also both passed a director-approved class in landscape irrigation and has been awarded Austin Water Authorized Irrigation Inspector status in accordance with rules adopted pursuant to this chapter.
52 53 54 55	(7)	BLEED-OFF (BLOWDOWN) means the circulating water in a cooling tower which is discharged to help keep the dissolved solids concentrating in the water below a maximum allowable limit.
56 57 58	(8)	BLOWDOWN METER or discharge meter means a meter that tracks the amount of water discharged from a cooling tower system.
59 60 61 62	(9)	COMMERCIAL FACILITY means a site with five or more dwelling units, or a municipal, business, or industrial building and the associated landscaping, but does not include the fairways, greens, or tees of a golf course.
63 64 65	(10)	COMMERCIAL NURSERY means a facility where plant nursery stock, trees, seedlings, turf, shrubs, flowers, herbs, crops or other plant materials are cultivated, grown, stored, or

66 67 68		maintained prior to retail consumer, installer, or reseller purchase, use, consumption, or installation of the materials at any location other than the commercial nursery.
69 70 71 72	(11)	COMMON AREA means an area held, designed, or designated for the common use of the owners or occupants of a townhouse project, planned unit development, apartment, condominium, mobile home park, or subdivision.
73 74 75	(12)	CONCENTRATION means re-circulated water in a cooling tower that has elevated levels of total dissolved solids as compared to the original make-up water.
76 77 78 79	(13)	CONDUCTIVITY CONTROLLER means a device used to measure the conductivity of total dissolved solids in the water of a cooling system and control the discharge of water in order to maintain efficiency.
80 81 82 83 84	(14)	COOLING TOWER means an open water recirculation system that uses fans or natural draft to draw or force air to contact and cool water through the evaporative process that removes heat from water-cooled air conditioning systems and from industrial processes.
85 86 87 88 89 90	(15)	COSMETIC POWER WASHING means treatment or cleaning of a surface with specialized equipment that uses a spray of or directed water for the cosmetic cleaning of buildings, vehicles or other mobile equipment, or outdoor surfaces. It does not include industrial cleaning, cleaning associated with manufacturing activities, hazardous or toxic waste cleaning, or cleaning necessary to remove graffiti.
92 93 94	(16)	CYCLES OF CONCENTRATION means the ratio of the dissolved solids in recirculating water to the dissolved solids in the make-up water
95 96 97 98	(17)	DESIGNATED OUTDOOR WATER USE DAY means the day during which a person is permitted to irrigate outdoors as prescribed in City Code Section 6-4-13(E) (<i>Water Conservation Guidelines</i>).
99	(18)	DIRECTOR means the Director of Austin Water.

100 101 102	(19)	DRIFT ELIMINATOR means a device that captures large water droplets caught in the cooling tower air stream to prevent the water droplets and mist from escaping the cooling tower.
103 104 105	(20)	DRIP IRRIGATION means a method of irrigation which is typically installed below ground and consists of porous piping that allows the application of water at a slow and constant rate.
106 107 108 109 110 111	(21)	DROUGHT CONTINGENCY PLAN means a strategy or combination of strategies for temporary supply management and demand management responses to temporary and potentially recurring water supply shortages and other water supply emergencies required by Texas Administrative Code Title 30, Chapter 288, Subchapter B.
112 113 114	(22)	FOUNDATION WATERING means an application of water to the soils directly abutting the foundation of a building, structure, or improvement on land.
115 116 117	(23)	GOVERNMENT PROPERTY means property owned or operated by a federal, state, or local governmental unit, entity, agency, or a government subdivision for a public purpose.
118 119	(24)	HOSE-END SPRINKLER means an above-ground water distribution device that may be attached to a garden hose.
120 121 122	(25)	MAKE-UP means the amount of water required to replace normal losses caused by bleed-off (blowdown), drift, and evaporation.
123 124	(26)	MAKE-UP METER or intake meter means a meter that measures the amount of water entering a cooling tower system.
125 126 127	(27)	MANUAL IRRIGATION SYSTEM means an irrigation system designed to require the manual operation of valves or the attachment of a quick-coupling device.
128 129	(28)	MULTI-FAMILY PROPERTY means property containing five or more dwelling units.
130	(29)	NEW LANDSCAPE means vegetation:

131 132	(a)	installed at the time of the construction of a residential or commercial facility;
133 134	(b)	installed as part of a governmental entity's capital improvement project;
135	(c)	installed to stabilize an area disturbed by construction; or
136 137	(d)	that alters more than 500 contiguous square feet of an existing landscape.
138 139 140 141	(30)	ONSITE ALTERNATIVE WATER SOURCE means a water source including recycled manufacturing process water, air conditioner condensate, rainwater, stormwater, graywater, black water, cooling tower blow down, and foundation drain water.
142 143 144	(31)	ORNAMENTAL FOUNTAIN means an artificially created structure from which a jet, stream, or flow of water emanates and the water is not used for the preservation of aquatic life.
145 146 147 148	(32)	OVERFLOW ALARM means a system that includes a level switch and an electronic signaling device that sends an audible signal or provides an alert via the energy management control system to the tower operator in case of sump overflow.
149 150 151 152	(33)	PERMANENTLY INSTALLED IRRIGATION SYSTEM means a custom- made, site-specific system of delivering water generally for landscape irrigation via a system of pipes or other conduits installed below ground.
153 154 155 156 157 158 159	(34)	PERSON means any natural person or legal entity such as an individual, business, partnership, association, firm, corporation, governmental, or other natural, business, or legal entity that receives, requests, manages, uses, maintains, or is responsible for water utility service at a service address, whether or not the person or entity is a customer or account holder of Austin Water.
160 161 162	(35)	PREMISE means the outdoor area of property not enclosed by fencing or walls or containing living areas, and not including areas for storing vehicles or other motorized equipment.

163 164	(36)	RECLAIMED WATER means reclaimed municipal wastewater that is under the direct control of the City treatment plants,
165		satellite facilities, or a treatment plant with which the City
166 167		contracts, and that has been treated to a quality that meets or exceeds the minimum standards of the 30 Texas Administrative
168		Code, Chapter 210.
160	(27)	
169 170	(37)	RESIDENTIAL FACILITY means a site with four or fewer dwelling units.
171	(38)	SOAKER HOSE means a perforated or permeable garden-type
172		hose or pipe that is laid above ground that provides irrigation at
173		a slow and constant rate.
174	(39)	TEMPORARILY INSTALLED IRRIGATION SYSTEM
175		means a universally applicable above ground irrigation system
176		that uses a flexible hose or hardened pipe to deliver water to a
177		moveable water distribution device.
178	(40)	TON means an evaporative cooling ton of 15,000 British
179		Thermal Units (BTUs) per hour.
180	(41)	VEHICLE WASH FACILITY means a permanently-located
181		business that washes vehicles or other mobile equipment with
182		water or water-based products, including but not limited to self-
183 184		service car washes, full service car washes, roll-over/in-bay style car washes, and facilities managing vehicle fleets or
185		vehicle inventory.
	(12)	
186 187	(42)	XERISCAPE means a landscape which employs certain principles of design and installation which conserve water and
188		energy and where the plant material, at mature growth, will
189		provide at least 50% of the new landscape's areal coverage. The
190		plant material must consist of plants identified on a plant list
191		provided by Austin Water that are very low water usage and
192		low water usage plants.
193	_	ode Section 6-4-3 (Applicability of Regulations; Affirmative
194	Defenses) is amen	ded to read as follows:
195	§ 6-4-3 - APPLIC	CABILITY OF REGULATIONS; AFFIRMATIVE
196	DEFENSES.	

197 This chapter applies to a person who uses, directs, manages, or allows (A) 198 the use of potable water supplied by Austin Water [Utility]. The chapter does not apply to a person [who] when the person only uses, 199 200 directs, manages, or allows the use of auxiliary water or reclaimed water unless the auxiliary water or reclaimed water is mixed with 201 potable water supplied by Austin Water Utility]. 202 203 It is an affirmative defense to a violation of this chapter that the use of (B) 204 water that gave rise to the violation was consistent with the agreed 205 upon terms and conditions of a water service contract with a 206 wholesale water customer and that the use did not constitute water 207 waste. It is an affirmative defense to a violation of this chapter that the use of 208 (C) 209 water that gave rise to the violation properly utilized solely auxiliary 210 water, and did not endanger public health, safety, or property. 211 (D[C]) It is an affirmative defense to a violation of this chapter that the use of 212 water that gave rise to the violation properly utilized solely reclaimed 213 water, did not endanger public health, safety, or property, and did not 214 constitute water waste in accordance with 6-4-12 (Water Waste 215 Prohibited). 216 (E[D])It is an affirmative defense to a violation of this chapter that the act or 217 omission that gave rise to the violation occurred solely because a documented emergency that prevented strict compliance, and that the 218 219 act or omission did not disrupt the availability of adequate water for 220 other public emergency response or fire fighting or fire suppression 221 purposes. PART 4. City Code Section 6-4-7 (Administrative Rules) is repealed and replaced 222 223 with a new Section 6-4-7 to read as follows: 224 § 6-4-7 - ADMINISTRATIVE RULES. The director may adopt administrative rules as necessary for the 225 (A) 226 implementation of this chapter. 227 (B) Before the director may adopt or amend a nonemergency rule, the 228 director will present the proposed rule to the Water and Wastewater 229 Commission and the Resource Management Commission. In cases of 230 emergency rule adoption, the director will present the rule to the

231 232 233		Water and Wastewater Commission and the Resource Management Commission as soon as practicable following emergency rule adoption.
234 235 236	(C)	The rules shall be available for inspection on Austin Water's website and at the Austin Water administrative offices during normal business hours.
237 238		City Code Section 6-4-10 (<i>Facilities Regulated</i>) is repealed and replaced Section 6-4-10 to read as follows:
239	§ 6-4-10 - F	FACILITIES REGULATED.
240 241 242 243 244 245	(A) T	The owner or water account holder of a commercial, or multi-family residential situated on property equal to or greater than 1.0 acre in size shall obtain an evaluation of any permanently installed automatic irrigation system conducted at a frequency prescribed by rules adopted pursuant to this chapter. The irrigation evaluation shall, at a minimum:
246 247 248 249		(1) be conducted by an Austin Water authorized irrigation inspector who has been authorized in accordance with rules adopted pursuant to this chapter and whose authorization is reflected in records maintained by Austin Water;
250		(2) be documented on forms provided by Austin Water; and
251 252 253 254		(3) verify that the irrigation system operating on the property complies with all applicable requirements of this chapter, rules adopted pursuant to this chapter, and other applicable technical codes.
255 256 257 258	(B)	The owner, or any water account holder, of vehicle washing facilities shall provide an evaluation of all vehicle washing equipment conducted at a frequency prescribed by rules adopted pursuant to this chapter. The vehicle washing facility evaluation shall, at a minimum:
259 260		(1) be conducted by a Texas-licensed plumber of the vehicle washing facility's choice;
261		(2) be documented on forms provided by Austin Water; and

262 263 264		(3) establish that the equipment is operating in compliance with equipment standards prescribed by rules adopted pursuant to this chapter.
265	(C)	The owner or water account holder of a cooling tower must:
266 267		(1) register the tower with Austin Water using a form provided by Austin Water;
268		(2) register a new or replacement tower prior to operation; and
269 270 271 272 273 274		(3) submit a fully completed annual inspection of the tower to Austin Water by March 1 of each year using a form provided by Austin Water verifying that the cooling tower is properly permitted and complies with all applicable requirements of this chapter, rules adopted pursuant to this chapter, and applicable technical codes. The inspection must:
275 276 277 278 279 280		(a) be performed by an independent third-party Texas- licensed mechanical or chemical engineer, or a person holding a Texas Department of Licensing and Regulations Air Conditioning and Registration License (Class A) with a combined endorsement for process cooling and refrigeration; and
281 282		(b) be performed not more than 90 days before the March 1 due date.
283 284	(D)	A facility with 100 tons or greater of combined cooling capacity using an evaporative cooling tower must:
285 286 287		(1) have the make-up and blowdown meters and overflow alarm connected to the building's central energy management system or utility monitoring dashboard; and
288 289		(2) offset a minimum of 10% of the make-up water with reclaimed or onsite alternative water sources.
290 291 292	(E)	Restaurants, bars, and other commercial food or beverage establishments may not provide drinking water to customers unless a specific request is made by the customer for drinking water.

293 294 295 296 297 298 299	establi accom water mainta inform require	wner or operator of a hotel, motel, short term rental, or other ishment that offers or provides lodging or rental amodations for compensation shall offer a towel and linen reuse conservation option to its lodgers, renters, or customers and ain in each applicable guest room, suite, or property national signage to communicate information relating to this ement and to offer the opportunity for guest participation. de Section 6-4-11 (General Regulations) is amended to add new
301	Subsections (G) an	· · · · · · · · · · · · · · · · · · ·
302	(G) The own	ner or water account holder of a cooling tower must:
303 304 305	* *	operate the cooling tower in a manner to achieve a minimum of five cycles of concentration if the cooling tower utilizes potable water as its primary source of make-up water;
306	(2)	equip the cooling tower with:
307 308 309		(a) overflow sensors and alarms connected to the building's central energy management system or utility monitoring dashboard;
310 311		(b) make-up water and blowdown meters to manage water consumption;
312		(c) conductivity controllers; and
313 314 315		(d) a drift eliminator with a drift rate of not more than 0.005% of the circulated water flow rate for crossflow towers and 0.002% for counter flow towers;
316 317 318	biocid	wner or water account holder of a cooling tower shall use a e to treat the cooling system recirculation water to minimize the h of Legionella and other microorganisms.
319 320	PART 7. Subsecti amended to read as	on (B) of City Code Section 6-4-12 (Water Waste Prohibited) is follows:
321	(B) A pers	son may not:
322 323	(1)	fail to repair a controllable leak, including [but not limited to] a broken sprinkler head, a broken pipe or a leaking valve; [or]
		Page 10 of 29

324	(2)	opera	ate an irrigation system with:
325		(a)	a broken head; [or]
326 327 328		(b)	a head that is out of adjustment and the arc of the spray head is over a street, parking area, or other impervious surface; or
329		(c)	a head that is misting because of high water pressure;[-or]
330	(3)	allow	water flow during irrigation that:
331 332 333		(a)	runs, flows, or streams in a way that extends into a street, parking area, or other impervious surface for a distance of 50 feet or greater; or
334 335		(b)	allows water to pond to a depth greater than 0.25 inch in a street, parking area, or on other impervious surfaces[-]; or
336	<u>(4)</u>	oper	ate a cooling tower:
337 338		<u>(a)</u>	in a manner that allows an overflow from the cooling tower basin to occur; or
339		<u>(b)</u>	without a functioning drift eliminator.
340 341			D) and (E) of City Code Section 6-4-13 (<i>Water</i> s) are amended to read as follows:
342	§ 6-4-13 - WATH	ER CC	NSERVATION GUIDELINES.
343 344 345 346 347 348 349 350 351	[(Section 6-4-15)] remain in effect until such time as the city manager orders termination of the stage in accordance with Subsection (C) of [s]Section 6-4-13[(C)], (Water [Use] Conservation Guidelines). Unless a drought or emergency stage is expressly declared by order of the [C]city [M]manager, water use regulations of the Section 6-4-15 (Water Conservation Stage) [(section 6-4-15)] automatically resume by default immediately upon any ordered termination of any drought		
352 353	` ,		or water use subject to the provisions of this Chapter shall on a day designated for the applicable water use activity,
			Page 11 of 29

354	property/facility type, and street number address classification
355	indicated in the following table. A person may not conduct, authorize,
356	or permit outdoor water use except in accordance with the designation
357	schedule set out in the following table. In the following table,
358	"EVEN" or "ODD" correspond to the street number of the physical
359	property address where the outdoor water use occurs. The table below
360	shall be referred to as "the Outdoor Water Use Schedule".

Conservation Stage and Drought Response Stage 1 Watering Schedule				
Property Type	Watering Day			
Residential Property - Hose-end EVEN	Sunday and Thursday			
Public Schools	Monday			
Commercial/Multi family - Automatic & Manual EVEN	Tuesday			
Residential – Automatic & Manual ODD	Wednesday			
Residential - Automatic & Manual EVEN	Thursday			
Commercial/Multi Family - Automatic & Manual ODD	Friday			
Residential Property - Hose-end ODD	Wednesday and Saturday			
Drought Response Stage 2 and Stage 3 Watering Schedule				
Property Type	Watering Day			
Residential Property - Hose-end EVEN	Sunday			
Public Schools	Monday			
Commercial/Multi family - Automatic & Manual EVEN	Tuesday			
Residential - Automatic & Manual ODD	Wednesday			
Residential - Automatic & Manual EVEN	Thursday			

Commercial/Multi Family - Automatic & Manual ODD	Friday
Residential Property - Hose-end ODD	Saturday

- **PART 9.** Subsections (B) and (C) of City Code Section 6-4-14 (*Exemptions*) are amended to read as follows:
- 364 (B) The following activities shall be exempt from the application of Section 6-4-15 (Water Conservation Stage), Section 6-4-16 (Drought Response Stage One Regulations), Section 6-4-17 (Drought Response Stage Two Regulations), and Section 6-4-18 (Drought Response Stage Three Regulations):
 - (1) Outdoor irrigation:
 - (a) using a hand-held hose or refillable watering vessel;
 - (b) using drip irrigation;
 - (c) of trees using an automatic bubbler system or soaker hose placed within the drip-line of the tree canopy;
 - (d) of vegetable gardens using a soaker hose;
 - (e) of athletic fields used for organized sports practice, competition, or exhibition events when the irrigation is necessary to protect the health and safety of the players, staff, or officials present for the athletic event;
 - (f) immediately following a commercial lawn treatment application by an applicator who possesses required licensure as applicable for use of such substances including [but not limited to] fertilizer, pesticides, and herbicides, provided receipts documenting such application and the applicator's credentials are provided upon request to a designee of the director; or
 - (g) of plant material at a commercial nursery.
 - (2) Water use:

388 389 390 391	(a) necessary for repair or installation of a permanently <u>or</u> <u>temporarily</u> installed landscape irrigation system when the person performing the irrigation work is present in the area of irrigation; or			
392 393 394	(b) necessary for the repair, testing, or installation of an ornamental fountain when the person performing the testing, repair or installation is present.			
395 396 397	(C) The following activities shall be exempt from the application of Section 6-4-15 (<i>Water Conservation Stage</i>), Section 6-4-16 (<i>Drought Response Stage One Regulations</i>) requirements:			
398 399 400	(1) Water use necessary to comply with federal, state, or local land development permits requiring the establishment of new landscaping between the hours of 7:00 p.m. to 10:00a.m.; and			
401 402	(2) Irrigation of areas documented on a City approved and released site plan as golf course fairways, greens, or tees.			
403 404				
405 406 407 408	(D) A person may not irrigate outdoors at a residential facility or a commercial facility with a hose-end or <u>manual</u> sprinkler system between the hours of 10:00 a.m. and 7:00 p.m., even if the irrigation occurs on the designated outdoor water use day for the location.			
409 410				
411 412 413 414	(D) A person may not irrigate outdoors at a residential facility or a commercial facility with a hose-end or <u>manual</u> sprinkler system between the hours of 10:00 a.m. and 7:00 p.m. even if the irrigation occurs on the designated outdoor water use day for the location.			
415 416				
417 418 419	(D) A person may not irrigate outdoors at a residential facility or a commercial facility with a hose-end or <u>manual</u> sprinkler system except between the hours of 7:00 a.m. and 10:00 a.m. or between the			

420 421	hours of 7:00 p.m. and 10:00 p.m. even if the irrigation occurs on the designated outdoor water use day for the location.			
422 423	PART 13. Subsection (B) of City Code Section 6-4-19 (<i>Emergency Stage Four Regulations</i>) is amended to read as follows:			
424 425 426	(B) A person may not use or allow the use of water to test or repair a permanently <u>or temporarily</u> installed irrigation system or drip irrigation system.			
427 428	PART 14. Subsection (A) of City Code Section 6-4-30 (<i>Variance</i>) is amended to read as follows:			
429 430	(A)		lirector may grant a variance from a requirement of this chapter director determines that special circumstances exist and that:	
431 432 433		(1)	strict compliance with the provisions at issue adversely affects the health, safety, welfare or sanitation of the public, the applicant, or the environment; or	
434 435 436 437 438 439		(2)	strict compliance with the provisions at issue substantially threatens the applicant's primary source of income, the applicant is employing all reasonable water conservation measures, and approval of the variance will not result in water waste in accordance with Section 6-4-12 (<i>Water Waste Prohibited</i>).	
440 441	PART 15. City Code Chapter 6-4, Article 3 (<i>Enforcement</i>) is repealed and replaced with Article 5 (<i>Enforcement</i>) to read as follows:			
442	ARTICLE 5. ENFORCEMENT.			
443	§ 6-4-50 AP	PLIC	CABILITY.	
444	This article applies to all parts of this chapter.			
445	§ 6-4-51 OFFENSE.			
446	(A)	A pe	erson commits an offense if the person:	
447 448		(1)	directs, performs, authorizes, requests, allows, assists, facilitates, or permits an act prohibited by this chapter;	